

Date: Sat, 25 Dec 93 04:30:09 PST  
From: Ham-Ant Mailing List and Newsgroup <ham-ant@ucsd.edu>  
Errors-To: Ham-Ant-Errors@UCSD.Edu  
Reply-To: Ham-Ant@UCSD.Edu  
Precedence: Bulk  
Subject: Ham-Ant Digest V93 #153  
To: Ham-Ant

Ham-Ant Digest                      Sat, 25 Dec 93                      Volume 93 : Issue 153

Today's Topics:

2M from 11M Question. (2 msgs)  
6m quad design,help  
Better Gain antenna for HT?  
Hustler Mobile as Base Antenna  
need comments on MFJ antennas and accessories  
Vertical Antenna Question

Send Replies or notes for publication to: <Ham-Ant@UCSD.Edu>  
Send subscription requests to: <Ham-Ant-REQUEST@UCSD.Edu>  
Problems you can't solve otherwise to brian@ucsd.edu.

Archives of past issues of the Ham-Ant Digest are available  
(by FTP only) from UCSD.Edu in directory "mailarchives/ham-ant".

We trust that readers are intelligent enough to realize that all text  
herein consists of personal comments and does not represent the official  
policies or positions of any party. Your mileage may vary. So there.

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Date: Thu, 23 Dec 1993 05:50:50 GMT  
From: ucsnews!sol.ctr.columbia.edu!howland.reston.ans.net!news.intercon.com!udel!  
news.sprintlink.net!direct!news.direct.net!wizkid@network.ucsd.edu  
Subject: 2M from 11M Question.  
To: ham-ant@ucsd.edu

I am new to the world of VHF and UHF and have a question about the  
conversion of a centerloaded 11M magmount to a 2M magmount. I have built  
many HF antennes, I with my limited understanding of small VHF antennes,  
I can only see this being done as a 5/8ts. I have heard of this, can  
it be done? (And is it a good idea, assuming a magmount 11M is very cheap  
and at every hamfest.)

-Brian  
KB7TSY  
Carl Hayden Amateur Radio Club - Phoenix, AZ

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Date: Thu, 23 Dec 1993 16:33:29 GMT  
From: valinor.mythical.com!n5ial!jim@uunet.uu.net  
Subject: 2M from 11M Question.  
To: ham-ant@ucsd.edu

In article <CIH48r.GAJ@news.direct.net> wizkid@indirect.com  
(Brian Pollack) writes:

> I am new to the world of VHF and UHF and have a question about the  
> conversion of a centerloaded 11M magmount to a 2M magmount. I have built  
> many HF antennes, I with my limited understanding of small VHF antennes,  
> I can only see this being done as a 5/8ts. I have heard of this, can  
> it be done? (And is it a good idea, assuming a magmount 11M is very cheap  
> and at every hamfest.)

I don't know about using the center-loaded variety, but one of my 2m mobile  
antennas (currently down for new coax) was once an 11m antenna that I found  
laying around. It was a bottom-loaded antenna, and I just removed the  
loading coil, adjusted the length of the element, and added my own coil for  
a 5/8 wave. See the ARRL Antenna Book for details.

If nothing else, you could toss the existing whip in the trash, use the  
mag-mount base, and get some welding rod or whatever is the correct  
diameter for the base and cut it to size. If I were you, I'd still make  
sure there aren't any matching networks setup in the base---those could  
throw everything off. :-)

Since then, this antenna has become a plain old 1/4 wave, due to the fact  
that the tuning on the 5/8 wave was really strange (probably my lousy job  
of winding the coil---I wasn't very good at that then). Except for the  
fact that it now needs new coax, it's been a very good and very reliable  
antenna.

Oh, btw, the 1/4 wave that's on the truck now is also a homebrew, but it  
was just built from a surplus mag-mount base someone gave me. I believe  
that was originally a UHF antenna, though I'm not sure on that one. It  
also works very nicely. :-)

Later,  
--jim

--

#include <std\_disclaimer.h>

73 DE N5IAL (/4)

-----< Running Linux 0.99 PL10 >-----

Internet: jim@n5ial.mythical.com | j.graham@ieee.org

ICBM: 30.23N 86.32W

Amateur Radio: (packet station temporarily offline)

AMTOR SELCAL: NIAL

E-mail me for information about KAMterm (host mode for Kantronics TNCs).

Date: Fri, 24 Dec 1993 13:46:14 GMT  
From: swrinde!emory!darwin.sura.net!perot.mtsu.edu!raider!theporch!jackatak!  
root@network.ucsd.edu  
Subject: 6m quad design,help  
To: ham-ant@ucsd.edu

gwood@robins.af.mil (Greg Wood Mr) writes:

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> Needs help on a design for a 6m quad 3,4,5 element
> would be just great can some one out there please help me
> out
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Get a copy of Cowan and Orr "The Cubical Quad" a paperback of no major thickness, but crammed with design information.

Be careful as you scale down for 50MHz, because the wire size used in your elements will begin to have an effect: I have never played with 50MHz, but #18 wire made a 146MHz 5 element quad go about 4MHz low in frequency -- so shorten by 2% (at 50MHz) and try it.

Good luck,  
73,  
Jack. W4PPT/Mobile  
(! card shy of 75M SSB WAS from the Mobile -- sure hope Santa goes  
through Vermont on his way to Tennessee! ;^)

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+-----+
| Jack GF Hill          |Voice: (615) 459-2636 -           Ham Call: W4PPT |
| P. O. Box 1685        |Modem: (615) 377-5980 -   Bicycling and SCUBA Diving |
| Brentwood, TN 37024  |Fax:   (615) 459-0038 -           Life Member - ARRL |
| root@jackatak.raider.net - "Plus ca changer, plus c'est la meme chose" |
+-----+
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Date: Thu, 23 Dec 1993 14:56:53 -0700  
From: orca.es.com!cnn.sim.es.com!msanders.sim.es.com!user@uunet.uu.net  
Subject: Better Gain antenna for HT?  
To: ham-ant@ucsd.edu

In article <millerde.4.000AF020@spot.colorado.edu>, millerde@spot.colorado.edu (Peter M. Miller) wrote:

> I need suggestions for a HT antenna that has better than 1 dB gain and  
> is still flexible. I am looking for a rubber-whip-type that is not longer  
> than 20".  
>  
>  
> Thanx in advance  
>  
> millerpe@spot.colorado.edu

I'm using the Slim Duck 2M flexible, about 11". It does significantly  
better than the original rubber duck, while remaining flexible. Only  
about \$20.

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Opinions, thoughts, &cetera are my own (when I can remember them).

"He flies the sky  
Like an Eagle in the eye  
of a hurricane that's abandoned."

KB7MSF  
UTAH

America

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Date: Fri, 24 Dec 1993 00:56:37 GMT  
From: ucsnews!sol.ctr.columbia.edu!math.ohio-state.edu!magnus.acs.ohio-state.edu!  
usenet.ins.cwru.edu!news.csuohio.edu!sww@network.ucsd.edu  
Subject: Hustler Mobile as Base Antenna  
To: ham-ant@ucsd.edu

Hi ...

Over 82 days of camping in 1993, the far majority were spent with  
a pactor link to home. Many were with a friend, WA8BXN. Mike would  
use a standard Hustler mast mounted to the roof rack on his camping  
trailer. I would erect a full size Hustler vertical. Both of us would  
use the tops of our campers as highly efficient ground planes.

In no case was the vertical able to outperform the mast and  
resonator used by BXN to the degree that it was worthwhile taking.  
I do not intend to continue to lug the big vertical about with me.  
Well ... I probably will take it to Dayton and on our longer trips,  
however, no longer on our short ventures.

A good ground is of paramount importance. An alligator clip  
to a wire was found to be a very, very poor substitute to a wing-  
nut tightened lug attachment. A groundplane will make or break the  
system. Take the ground off and you get fluctuating readings that  
change with any change of conditions. Put it on and the antenna

stabilizes.

We did experiment with long wires to our MFJ-949D tuners. The results were ... not worth the hassle. However, more experimentation is needed before we toss the idea.

73,

Steve, N08M.#NEOH.OH.USA.NA

ag807@cleveland.freenet.edu (works much better than csuohio)

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Date: Wed, 22 Dec 1993 20:54:36 GMT

From: csus.edu!netcom.com!n1ist@decwrl.dec.com

Subject: need comments on MFJ antennas and accessories

To: ham-ant@ucsd.edu

In article <199312220147.AA18359@yfn.ysu.edu> ah301@yfn.ysu.edu (Jerry Sy) writes:  
-Also, is the MFJ J Pocket Rollup antenna any good (\$15)?

Sounds pricey. It is a twinlead J-pole; make your own from some 300 ohm twinlead and a length of 50 ohm coax with a BNC on the end. I think MFJ puts a ferrite bead on the coax at the connection to the twinlead.

>how about telescopic antennas for HT (MFJ-1714, \$17) ? how does this  
>compare to the AEA hot rod (\$25) ?

I have never compared the two, but I use the MFJ half-wave telescoping as my base antenna (indoors). I made a bracket from some scrap aluminum and a BNC bulkhead adapter and bolted it to the back of a bookcase. Good SWR and even works up to 50 Watts. Just be careful using it on an HT - it is 1 meter long!

-are the MFJ speaker mikes for HTs good ?

The little ones are junk (poor quality audio). The larger size works nicely.

/mike

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\\| Michael L. Ardai N1IST Teradyne ATG Boston

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/|\ ardai@maven.dnet.teradyne.com n1ist@netcom.com

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Date: Thu, 23 Dec 1993 18:22:19 GMT

From: library.ucla.edu!agate!howland.reston.ans.net!cs.utexas.edu!swrinde!emory!  
rsiatl!ke4zv!gary@network.ucsd.edu  
Subject: Vertical Antenna Question  
To: ham-ant@ucsd.edu

In article <CIHy76.K8D@SSD.intel.com> rlt@ssd.intel.com (Roger Traylor) writes:

>I have a vertical antenna question. In most explanations of how  
>a typical vertical antenna works, a picture is shown of a 1/4 wave  
>vertical with its image projecting into the earth. (assuming ground  
>mounted antenna) I have a situation that would place my vertical  
>antenna directly over an irrigation well which is about 30 ft deep.  
>My frequency of interest here is 7Mhz. There is water in about the  
>last 15 feet of the well.

>

>My question is: If I can drop a ~30 foot wire down the well as the  
>1/4 wave image, will a substantial ground radial system still be  
>required? Would this work at all?

It'll sorta work, but it won't work very well. Let's try to look  
at why it won't work properly. Take a pencil and place the point  
against a mirror. What do you see? You see a virtual pencil  
mirrored behind the real pencil. Now look behind the mirror.  
Do you see the virtual pencil sticking back there? No you don't.  
So stick a second pencil back there and steam up the mirror  
real good to make it a poor reflector. Now bring the original  
pencil back in contact with the mirror. Do you see the "virtual"  
pencil you're holding behind the steamed mirror? Of course not,  
and neither will the radio waves from your monopole see the water  
well as a virtual electrical image because of the lossy ground.  
You have to put down the radials and make the ground a better  
mirror at RF.

Gary

--

Gary Coffman KE4ZV		You make it,		gatech!wa4mei!ke4zv!gary
Destructive Testing Systems		we break it.		uunet!rsiatl!ke4zv!gary
534 Shannon Way		Guaranteed!		emory!kd4nc!ke4zv!gary
Lawrenceville, GA 30244				

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End of Ham-Ant Digest V93 #153

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